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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/524,920	12/21/2005	Yoshitsugu Morita	71,051-002	2979

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HOWARD & HOWARD ATTORNEYS PLLC
450 West Fourth Street
Royal Oak, MI 48067

EXAMINER	
KASSA, TIGABU	

ART UNIT	PAPER NUMBER
1619	

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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/524,920	MORITA ET AL.	
	Examiner	Art Unit	
	TIGABU KASSA	1619	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *23 September 2008*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-13* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-13* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

This Office Action is in response to the amendment filed September 23, 2008. **Claims 1-13 are pending. Claims 1-13 are under consideration in the instant office action**.

Applicant's arguments filed on 09/23/08/, with regards to 35 USC 112, second paragraph, have been considered and are persuasive. Thus because instant claims 9-10 and 12-13 were not rejected using the prior art in the previous Non-final office action mailed on 06/23/08, a **new** Non-final is being mailed.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

The factual inquiries set forth in *Graham* **v.** *John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various

claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

Claims 1-8 and 11 remain rejected under 35 U.S.C. 103(a) as being unpatentable over Kobayashi et al. (US patent 5,928,660, Issued on July 27, 1999) in view of Tanaka et al. (WO 02/094213, Published on 28/11/2002) and as evidenced by (Frederick C. Mish et al. Webster's ninth new collegiate dictionary, 1097, Meriam-Webster Inc., 9th edition, 1990), and (http://www.dowcorning.com/content/sitech/sitechbasics/siloxane_polymerization.asp) for the reasons of record set forth in the office action mailed on June 23, 2008 and further articulated and rearranged below in new format.

Applicant Claims

Applicant claims aqueous suspensions of cross-linked silicone particles comprising cross-linked silicone particles with an average particle size of from 0.5 to 500 μm, surfactant (N-acyl-, N-hydrocarbon taurines), and water. Furthermore, applicant claims the aqueous suspensions contain non-cross-linkable oil in the cross-linked silicone particles and % weight ranges for the three components of the aqueous suspensions. Additionally, applicant claims cosmetic raw materials comprising the aqueous suspensions and the aqueous emulsions, wherein in the aqueous suspensions the N-acyl-, N-hydrocarbon taurine is selected from the group of sodium N-lauroyl methyl taurine, sodium N-myristoyl methyl taurine.....).

Determination of the Scope and Content of the Prior Art (MPEP §2141.01)

Kobayashi et al. discloses a raw material for cosmetic use comprising an aqueous suspension of a powdered silicon rubber (column 2, lines 14-16). The mean particle size of this powdered silicone rubber is in the range of 0.1 to 50 microns, and is preferably in the range of 0.5 to 50 (column 2, lines 17-20) and with particle size of 0.1 to 500 microns (see Abstract). Silicone rubber is "a rubber made from silicone elastomers and noted for its retention of flexibility, resilience, and tensile strength over a wide temperature range" as defined by (Frederick C. Mish et al. Webster's ninth new collegiate dictionary, 1097, Meriam-Webster Inc., 9th edition, 1990). In basic silicone chemistry it is also known that silicone elastomers are cross-linked fluids whose three-dimensional structure is much more intricate than a gel (http://www.dowcorning.com/content/sitech/sitechbasics/siloxane_polymerization.asp). Hence, the powdered silicon rubber particles are cross-linked particles. Kobayashi et al. also discloses that in order to achieve a stable dispersion of these silicone rubber compositions as fine particles in water, it is desirable to use one or more nonionic, cationic, and/or anionic surfactants and also specifically mentions that "since these surfactants are mixed with the cosmetic "as is", it is necessary to use surfactants that can be utilized as cosmetic raw materials."

Kobayashi et al. teach that the aqueous suspension of a powdered silicone rubber contains a non-cross-linked oil (column 3, lines 24-28).

Kobayashi et al. teach that the content of the powdered silicone rubber in the composition is in the range of 10 to 80 wt %, (column 5, lines 42-45), 50 parts by weight of water (column 7, lines 59-61), and surfactant in the range of 0.1 to 20 parts by weight (preferably 0.5 to 10 parts by weight) per 100 parts by weight of silicone rubber composition.

Kobayashi et al. (US patent 5,928,660) also teaches the three components of the aqueous suspension as discussed above while addressing instant claim 1. Additionally, Kobayashi et al. also discloses that the suspension also contains non-cross-linked oil specifically being added in the silicon rubber powder particles as discussed above. Kobayashi et al. also specifically gives examples were an aqueous emulsion of silicone rubber composition after the addition of the oil (column 1, lines 60-61 and column 8, lines 61-65), which addresses the limitation of the aqueous emulsions of cross-linked silicone particles as recited in instant claim 4.

Kobayashi et al. also teach that the content of the non-cross-linked oil in the powdered silicone rubber is 80 wt % or less and a content of 50 wt% or less is especially desirable (column 4, lines 56-63), 50 parts by weight of water (column 7, lines 59-61), and surfactant in the range of 0.1 to 20 parts by weight (preferably 0.5 to 10 parts by weight) per 100 parts by weight of silicone rubber composition. Kobayashi et al. teach a cosmetic raw material which allows the uniform dispersion of a powdered silicone rubber in a cosmetic containing the above discussed components including the aqueous emulsion.

Ascertainment of the Difference Between Scope the Prior Art and the Claims (MPEP §2141.012)

Although Kobayashi et al. (US patent 5,928,660) teaches that in order to achieve a stable dispersion of these silicone rubber compositions as fine particles in water, it is desirable to use one or more nonionic, cationic, and/or anionic surfactants, Kobayashi et al. does not explicitly teach the N-acyl, hydrocarbon taurines as surfactant. This deficiency is cured by the teachings of Tanaka et al.

Tanaka et al. teach the use of N-acyl-, N-hydrocarbon taurines as surface stabilizing agents (surfactants) to stabilize the dispersion of a raw material for cosmetic use comprising polyorganosiloxane and water (see Abstract and page 9, lines 1-9).

Finding of Prima Facie Obviousness Rationale and Motivation (MPEP §2142-2143)

It would have been prima facie obvious to one of ordinary skill in the art at the time the invention was made to modify the composition of Kobayashi et al. by incorporating N-acyl-, N-hydrocarbon taurines in the composition as a surfactant, because Tanaka et al teach the use of N-acyl-, N-hydrocarbon taurines as surface stabilizing agents (surfactants)/. An ordinary skilled artisan would have been motivated to add N-acyl-, N-hydrocarbon taurines as surface stabilizing agents, because the N-acyl-, N-hydrocarbon taurines can be used to stabilize the dispersion of a raw material for cosmetic use comprising polyorganosiloxane and water (see Tanaka et al. Abstract and page 9, lines 1-9). Furthermore, it would have been prima facie obvious to one of ordinary skill in the art at the time the invention was made to substitute one surfactant type by the other for the same intended use namely stabilization of the cosmetic composition. One of ordinary skill in the art at the time of the instant application was filed would have had a reasonable expectation of success upon combining the teachings of the teachings of Kobayashi et al. and Tanaka et al., because both references teach similar cosmetic compositions.

Therefore, the invention as a whole would have been *prima facie* obvious to one of ordinary skill in the art at the time the invention was made, as evidenced by the references, especially in the absence of evidence to the contrary.

Response to Arguments

Applicant's claim amendments and arguments filed 9/23/08 have been fully considered but they are not persuasive. Thus, the instant rejection is deemed to remain **proper and is maintained.**

The Examiner respectfully disagrees with Applicant's traversal arguments by amending the claims changing the particle size of cross-linked silicone particles from 0.5-500 μm and presenting other arguments. Applicant argues that it would not have been prima facie obvious to incorporate the N-acylalkyltaurine disclosed by Tanaka et al. as the surfactant in a cosmetic composition also containing silicone particles and water because there is no reason or motivation to substitute the N-acylalkyltaurine. The examiner already pointed out in the previous office action that the substitution of one surfactant for another is inherently prima facie obvious. Further motivation for the use of N-acylalkyltaurine can be found in the discussion of the background art by Tanaka et al. on page 1 wherein Tanaka et al. teach that polydiorganosiloxanes in combination with other surfactants previously taught in the art produced unsatisfactory cosmetics. Specifically, the cosmetics were irritating to users' skin or scalp and the cosmetic also yellowed over time (page 1, lines 26-30). Because the invention comprises at its simplest a polydiorganosiloxane, an N-acylalkyltaurine (or salt thereof) and water (page 2, lines 11-13), one can conclude that the improved cosmetic feel and lack of yellowing claimed by Tanaka et al. is due to the use of the N-acylalkyltaurine. The skilled artisan, therefore, would have been motivated to use N-acylalkyltaurines to produce a non-irritating cosmetic which doesn't yellow. Applicant specifically mentions the issue of particle size wherein Tanaka et al. teach the use of particle sizes of less than 0.15 μm. The examiner

acknowledges that Tanaka et al. teaches the use of particle sizes of less than 0.15 μm; however Tanaka et al. teach the use of particle sizes of less than 0.15 μm as early as page 1 in the section discussing background art and is not directly related to the use of N-acylalkyltaurines (page 1, line 19). Instead, particle sizes of less than 0.15 μm are more directly related to the use of polyorganosiloxanes. Moreover, a more careful reading of page 4, lines 7-13 sited by applicants would reveal that Tanaka et al., in this section, are actually discussing the amount of N-acylalkyltaurines to be included in the composition. Applicants argued that Tanaka et al. disparage the use of 0.15 μm particles with 5 to 300 parts by weight of N-acylalkyltaurines. However, Tanaka et al. is actually teaching the reverse, that use of less than 5 parts by weight of the N-acylalkyltaurines would cause particle sizes greater than 0.15 μm. The issue of increased viscosity, moreover, is related to the use of more than 300 parts by weight of N-acylaklyltaurines—not to the particle sizes. Although the particle sizes taught by Tanaka et al. are smaller than those taught in the currently amended instant claims 1 and 4, the particle sizes taught by Kobayashi et al. are 0.1 to 500 μm (abstract and column 2, line 2) but more preferably 0.5 to 50 μm (column 2, line 19-20) which correspond to the particle sizes taught in the currently amended claims 1 and 4. Kobayashi et al. specifically teaches that cosmetic compositions containing powdered silicone rubber exhibit better spreading characteristics and skin feel if the particles sizes are within the range of 0.5 to 50 μm. The skilled artisan would not only be motivated to use the N-acylalkyltaurines as surfactants because of the non-irritating non-yellowing characteristics it imparts to the cosmetic, but would also have been motivated to use the particle sizes taught by Kobayashi et al. since the particle sizes are related to silicone rubber and not to the choice of surfactant. One could not conclude from the discussion of Tanaka et al.

that N-acylalkyltaurines should not be used in cosmetic compositions merely because the particle size range of the intended cosmetic differed from the size range taught by Tanaka et al. the composition. Specifically, one could not conclude that the use of N-acylalkyltaurines as a surfactant would render the composition taught by Kobayashi et al. unsatisfactory since Kobayashi et al. teach the use of one or more of a wide range of cosmetically acceptable surfactants (column 2, line 67-column 3, line 4). Tanaka et al. teach that N-acylalkyltaurines are not only cosmetically acceptable surfactants but more specifically have improved characteristics over other surfactants as already discussed. Therefore, the examiner maintains that the instantly claimed invention is prima facie obvious and therefore, unpatentable over the prior art described above.

New Rejection

Claims 1, 4, 9-10, and 12-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kobayashi et al. (US patent 5928660) in view of Kosmin (US Patent No. 2658072) and as evidenced by (Frederick C. Mish et al. Webster's ninth new collegiate dictionary, 1097, Meriam-Webster Inc., 9th edition, 1990), and (http://www.dowcorning.com/content/sitech/sitechbasics/siloxane_polymerization.asp).

Applicant Claims

Applicant claims in instant claim 1 aqueous suspensions of cross-linked silicone particles comprising cross-linked silicone particles with an average particle size of from 0.5 to 500 μm, surfactant (N-acyl-, N-hydrocarbon taurines), and water. Furthermore, applicant claims in instant claim 4 aqueous suspensions of cross-linked silicone particles comprising cross-linked silicone particles with an average particle size of from 0.5 to 500 μm, surfactant (N-acyl-, N-hydrocarbon

taurines), water, and oil. Additionally, applicant claims in instant claims 9-10 and 12-13 the aqueous suspensions and the aqueous emulsions a structurally different N-hydrocarbon taurine from the N-acylalkyl taurine.

Determination of the Scope and Content of the Prior Art (MPEP §2141.01)

The teachings of Kobayashi et al. are set forth above.

Ascertainment of the Difference Between Scope the Prior Art and the Claims (MPEP §2141.012)

Although Kobayashi et al. teach that in order to achieve a stable dispersion of these silicone rubber compositions as fine particles in water, it is desirable to use one or more nonionic, cationic, and/or anionic surfactants, Kobayashi et al. does not explicitly teach the N-acyl alkyl taurines as surfactant. This deficiency is cured by the teachings of Kosmin.

Kosmin teaches method of preparing valuable surface-active agents of higher N-alkyltaurines and their corresponding salts (column 1, lines 1-35). Kosmin teaches that the salts of N-tetradecyltaurine, particularly the alkali metal and ammonium salts thereof, are unique in that they posses outstanding detersive, wetting-out, and lathering properties (column 3, lines 27-32).

Finding of Prima Facie Obviousness Rationale and Motivation (MPEP §2142-2143)

It would have been prima facie obvious to one of ordinary skill in the art at the time the invention was made to modify the composition of Kobayashi et al. by incorporating N-alkyltaurines or their corresponding salts in the composition as a surfactant, because Kosmin teaches the use of N- alkyltaurines or their corresponding salts as surfactants. An ordinary skilled artisan would have been motivated to add N-alkyltaurines or their corresponding salts as surface

stabilizing agents, because the N-alkyltaurines or their corresponding salts, for example, the salts of N-tetradecyltaurine, particularly the alkali metal and ammonium salts thereof, are unique in that they posses outstanding detersive, wetting-out, and lathering properties (column 3, lines 27-32). Furthermore, it would have been prima facie obvious to one of ordinary skill in the art at the time the invention was made to substitute one surfactant type by the other for the same intended use namely stabilization of the cosmetic composition. One of ordinary skill in the art at the time of the instant application was filed would have had a reasonable expectation of success upon combining the teachings of the teachings of Kobayashi et al. and Kosmin, because both references teach the use of surfactants.

Therefore, the invention as a whole would have been *prima facie* obvious to one of ordinary skill in the art at the time the invention was made, as evidenced by the references, especially in the absence of evidence to the contrary.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter, which the applicant regards as his invention.

Claims 9-10 and 12-13 **remain rejected** under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Based on the claim recitation component B in claim 1 recites N-acyl, N-hydrocarbon taurines represented by the general formula (I), which is a general formula of N-acyl taurines. Hence, the general formula (I) does not represent N-hydrocarbon taurines. In the same

manner, the structure recited in claims 9 and 12 represent N-hydrocarbon taurines not N-acyl taurines. Therefore, the examiner was expecting applicant to amend the claims reciting the appropriate taurine structures with the right corresponding names.

Conclusion

Claims 1-13 are pending and are rejected. No claims are allowed.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to TIGABU KASSA whose telephone number is (571)270-5867. The examiner can normally be reached on 9 am-5 pm Monday-Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Johann Richter can be reached on 571-272-0646. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Tigabu Kassa 01/13/09

/Mina Haghighatian/
Primary Examiner, Art Unit 1616